

Note: Tracks are now grouped by subcluster and scaled. Switching in subcluster is indicated by changes in track color. Track scale is now set by default to display the region 30 bp upstream of start 1 to 30 bp downstream of the last possible start. If this default region is judged to be packed too tightly with annotated starts, the track will be further scaled to only show that region of the ORF with annotated starts. This action will be indicated by adding "Zoomed" to the title. For starts, yellow indicates the location of called starts comprised solely of Glimmer/GeneMark auto-annotations, green indicates the location of called starts with at least 1 manual gene annotation.

## Pham 87033 Report

This analysis was run 04/28/24 on database version 559.

Pham number 87033 has 18 members, 4 are drafts.

Phages represented in each track:

Track 1 : Sparky\_62Track 2 : Farewell 64

• Track 3: DocMcStuffins\_70, SkinnyPete\_49, TootsiePop\_69, Piper2020\_72, Awesomesauce 71, ChickenDinner 73, Misha28 69

• Track 4: Rubeelu 54, Panchino 49, Butters 54, Charlie 52, Bosection6 52

Track 5 : Shweta\_50
Track 6 : Journey\_54
Track 7 : Donovan\_51

Track 8 : Xavia\_57

## Summary of Final Annotations (See graph section above for start numbers):

The start number called the most often in the published annotations is 8, it was called in 9 of the 14 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

• Awesomesauce\_71, Bosection6\_52, Butters\_54, Charlie\_52, ChickenDinner\_73, DocMcStuffins\_70, Misha28\_69, Panchino\_49, Piper2020\_72, Rubeelu\_54, SkinnyPete\_49, TootsiePop\_69,

Genes that have the "Most Annotated" start but do not call it:

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Genes that do not have the "Most Annotated" start:

Donovan\_51, Farewell\_64, Journey\_54, Shweta\_50, Sparky\_62, Xavia\_57,

# Summary by start number:

#### Start 6:

- Found in 2 of 18 (11.1%) of genes in pham
- Manual Annotations of this start: 1 of 14
- Called 50.0% of time when present
- Phage (with cluster) where this start called: Farewell 64 (AF).

#### Start 8:

- Found in 12 of 18 (66.7%) of genes in pham
- Manual Annotations of this start: 9 of 14
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Awesomesauce\_71 (F1), Bosection6\_52 (N), Butters\_54 (N), Charlie\_52 (N), ChickenDinner\_73 (F1), DocMcStuffins\_70 (F1), Misha28\_69 (F1), Panchino\_49 (N), Piper2020\_72 (F1), Rubeelu\_54 (N), SkinnyPete\_49 (N), TootsiePop\_69 (F1),

#### Start 9:

- Found in 1 of 18 (5.6%) of genes in pham
- Manual Annotations of this start: 1 of 14
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Xavia\_57 (P3),

#### Start 10:

- Found in 5 of 18 (27.8%) of genes in pham
- Manual Annotations of this start: 3 of 14
- Called 80.0% of time when present
- Phage (with cluster) where this start called: Donovan\_51 (P1), Journey\_54 (N), Shweta\_50 (N), Sparky\_62 (AF),

### Summary by clusters:

There are 5 clusters represented in this pham: F1, P3, AF, P1, N,

Info for manual annotations of cluster AF:

- •Start number 6 was manually annotated 1 time for cluster AF.
- •Start number 10 was manually annotated 1 time for cluster AF.

Info for manual annotations of cluster F1:

•Start number 8 was manually annotated 4 times for cluster F1.

Info for manual annotations of cluster N:

- •Start number 8 was manually annotated 5 times for cluster N.
- •Start number 10 was manually annotated 1 time for cluster N.

Info for manual annotations of cluster P1:

•Start number 10 was manually annotated 1 time for cluster P1.

Info for manual annotations of cluster P3:

•Start number 9 was manually annotated 1 time for cluster P3.

### Gene Information:

Gene: Awesomesauce\_71 Start: 43094, Stop: 43306, Start Num: 8 Candidate Starts for Awesomesauce\_71: (5, 43058), (Start: 8 @43094 has 9 MA's), (11, 43136), (12, 43250), (13, 43262), (14, 43292),

Gene: Bosection6\_52 Start: 34163, Stop: 34378, Start Num: 8 Candidate Starts for Bosection6 52:

(4, 34085), (Start: 8 @34163 has 9 MA's), (11, 34208), (12, 34322), (13, 34334), (14, 34364),

Gene: Butters\_54 Start: 35758, Stop: 35973, Start Num: 8

Candidate Starts for Butters\_54:

(4, 35680), (Start: 8 @ 35758 has 9 MA's), (11, 35803), (12, 35917), (13, 35929), (14, 35959),

Gene: Charlie\_52 Start: 33902, Stop: 34117, Start Num: 8

Candidate Starts for Charlie 52:

(4, 33824), (Start: 8 @ 33902 has 9 MA's), (11, 33947), (12, 34061), (13, 34073), (14, 34103),

Gene: ChickenDinner 73 Start: 44011, Stop: 44223, Start Num: 8

Candidate Starts for ChickenDinner 73:

(5, 43975), (Start: 8 @44011 has 9 MA's), (11, 44053), (12, 44167), (13, 44179), (14, 44209),

Gene: DocMcStuffins\_70 Start: 44011, Stop: 44223, Start Num: 8

Candidate Starts for DocMcStuffins\_70:

(5, 43975), (Start: 8 @ 44011 has 9 MA's), (11, 44053), (12, 44167), (13, 44179), (14, 44209),

Gene: Donovan 51 Start: 35505, Stop: 35714, Start Num: 10

Candidate Starts for Donovan\_51:

(2, 35355), (Start: 10 @35505 has 3 MA's), (11, 35544), (12, 35658), (13, 35670), (14, 35700),

Gene: Farewell\_64 Start: 42579, Stop: 42821, Start Num: 6

Candidate Starts for Farewell\_64:

(Start: 6 @ 42579 has 1 MA's), (Start: 10 @ 42612 has 3 MA's), (11, 42651), (12, 42765), (13, 42777), (14, 42807),

Gene: Journey 54 Start: 34748, Stop: 34957, Start Num: 10

Candidate Starts for Journey 54:

(2, 34598), (Start: 10 @34748 has 3 MA's), (11, 34787), (12, 34901), (13, 34913),

Gene: Misha28\_69 Start: 43099, Stop: 43311, Start Num: 8

Candidate Starts for Misha28 69:

(5, 43063), (Start: 8 @ 43099 has 9 MA's), (11, 43141), (12, 43255), (13, 43267), (14, 43297),

Gene: Panchino\_49 Start: 36055, Stop: 36270, Start Num: 8

Candidate Starts for Panchino\_49:

(4, 35977), (Start: 8 @ 36055 has 9 MA's), (11, 36100), (12, 36214), (13, 36226), (14, 36256),

Gene: Piper2020\_72 Start: 43994, Stop: 44206, Start Num: 8

Candidate Starts for Piper2020\_72:

(5, 43958), (Start: 8 @43994 has 9 MA's), (11, 44036), (12, 44150), (13, 44162), (14, 44192),

Gene: Rubeelu 54 Start: 35758, Stop: 35973, Start Num: 8

Candidate Starts for Rubeelu 54:

(4, 35680), (Start: 8 @ 35758 has 9 MA's), (11, 35803), (12, 35917), (13, 35929), (14, 35959),

Gene: Shweta\_50 Start: 35292, Stop: 35501, Start Num: 10

Candidate Starts for Shweta\_50:

(1, 35058), (2, 35142), (3, 35160), (Start: 10 @35292 has 3 MA's), (11, 35331), (12, 35445), (13, 35457),

Gene: SkinnyPete\_49 Start: 33470, Stop: 33682, Start Num: 8

Candidate Starts for SkinnyPete\_49: (5, 33434), (Start: 8 @33470 has 9 MA's), (11, 33512), (12, 33626), (13, 33638), (14, 33668),

Gene: Sparky\_62 Start: 43128, Stop: 43337, Start Num: 10

Candidate Starts for Sparky\_62:

(Start: 6 @43095 has 1 MA's), (Start: 10 @43128 has 3 MA's), (11, 43167), (12, 43281), (13, 43293), (14, 43323),

Gene: TootsiePop\_69 Start: 43099, Stop: 43311, Start Num: 8

Candidate Starts for TootsiePop\_69:

(5, 43063), (Start: 8 @ 43099 has 9 MA's), (11, 43141), (12, 43255), (13, 43267), (14, 43297),

Gene: Xavia\_57 Start: 41496, Stop: 41708, Start Num: 9

Candidate Starts for Xavia\_57:

(7, 41487), (Start: 9 @41496 has 1 MA's), (11, 41538), (12, 41652), (13, 41664), (14, 41694),